Tactical Unmanned Aerial Vehicle (TUAV)



MISSION

Provide reconnaissance, surveillance, and target acquisition (RSTA) to U.S. Army brigades and regiments at an initial range of 50 km, day or night, in limited adverse weather conditions with a future, objective range extending to 200 km.

DESCRIPTION AND SPECIFICATIONS

The Tactical Unmanned Aerial Vehicle (TUAV) is intended for use in environments where real-time information feedback is needed, but manned aircraft are unavailable, or excessive risk or other conditions render use of manned aircraft imprudent. A TUAV system consists of two ground control stations (GCSs), one portable ground control station, one portable ground data terminal, four remote video terminals (RVTs), a minimum of three air vehicles (AVs), modular mission payloads (MMPs), and launch and recovery equipment.

The GCS collects, processes, analyzes, and distributes digitized battlefield information by interfacing with present and planned service command, control, communications, computers and intelligence (C4I) systems. Flight and mission commands are sent to the AVs from the GCS. RSTA imagery and AV position data are downlinked directly to the GCS or RVTs located in tactical operations centers of the brigade, its subordinate battalions, and/or the direct support artillery or supporting aviation units. The complete TUAV system is transportable by two C-130 aircraft. Mission capability will be enhanced as advanced mission payloads become available, maximizing battlefield digitization to increase the effectiveness of other weapon systems.

FOREIGN COUNTERPART

Several of our allies are operating systems of a similar class, namely the U.K. (Phoenix), Israel (Searcher and Searcher II), France (Fox AT) and Sweden (Ugglan). Denmark, Belgium, and the U.K. are developing requirements or acquiring systems in the TUAV class. Open literature suggests that many countries have some type of system, but most are experimental.

FOREIGN MILITARY SALES

None

PROGRAM STATUS

• A reduced-footprint Hunter UAV system is currently being considered as a near-term surrogate for a TUAV in the Brigade Combat Team until the TUAV can be fielded. Also, the PM is exploring ways to accelerate the production of TUAV systems by as much as one year in support of the Army Vision.

- After conducting a full and open competition to select the best value, commercial off-the-shelf TUAV system, the Army selected AAI Corporation's Shadow 200.
- December 21, 1999: TUAV approved to enter into the engineering, manufacturing, and development phase and authorized the production of four low-rate initial production (LRIP) TUAV systems.
- December 27, 1999: The Army contracted with AAI Corporation for four LRIP TUAV systems.
- The Hunter UAV has been placed at the Joint Readiness Training Center, the U.S. Army Training and Doctrine Command schoolhouse, and in the 504th Military Intelligence Brigade/III Corps, until the TUAV is fielded. The Hunter is being used to support the continued development of UAV tactics, techniques, and procedures; concept of operations; and light force UAV spiral development and experimentation.

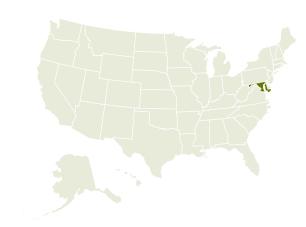
PROJECTED ACTIVITIES

FY00 Development of four TUAV LRIP systems, C4I testing and integration of the GCS, identification of the initial operational test and evaluation (IOT&E) test unit and IOT&E test location.

FY01 Developmental testing, delivery of four LRIP systems, operational testing, and Milestone II review.

PRIME CONTRACTOR(S)

AAI Corporation (Hunt Valley, MD)



* See appendix for list of subcontractors

